

# MCL103A...MCL103C

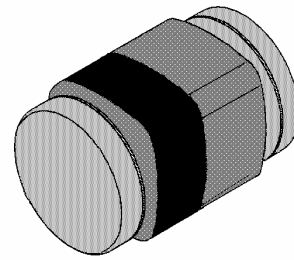
## SILICON SCHOTTKY BARRIER DIODES

for general purpose applications

LS-31

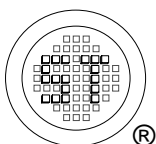
### Features

- Fits onto SOD 323 / SOT 23 footprints
- Micro Melf package



### Absolute Maximum Ratings ( $T_a = 25^\circ\text{C}$ )

	Symbol	Value	Unit
Peak Reverse Voltage	MCL103A $V_{RRM}$	40	V
	MCL103B $V_{RRM}$	30	V
	MCL103C $V_{RRM}$	20	V
Power Dissipation(Infinite Heatsink) $T_C = 3/8''$ from body derates at $4 \text{ mW}/^\circ\text{C}$ to 0 at $125^\circ\text{C}$	$P_{tot}$	400	mW
Single Cycle Surge 60Hz sinewave	$I_{FSM}$	15	A
Junction Temperature	$T_j$	125	$^\circ\text{C}$
Storage Temperature Range	$T_s$	- 55 to + 175	$^\circ\text{C}$



**SEMTECH ELECTRONICS LTD.**

(Subsidiary of Sino-Tech International Holdings Limited, a company  
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ISO/TS 16949 : 2002  
Certificate No. 05103



ISO 14001:2004  
Certificate No. 71116



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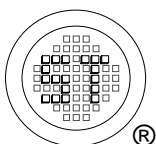
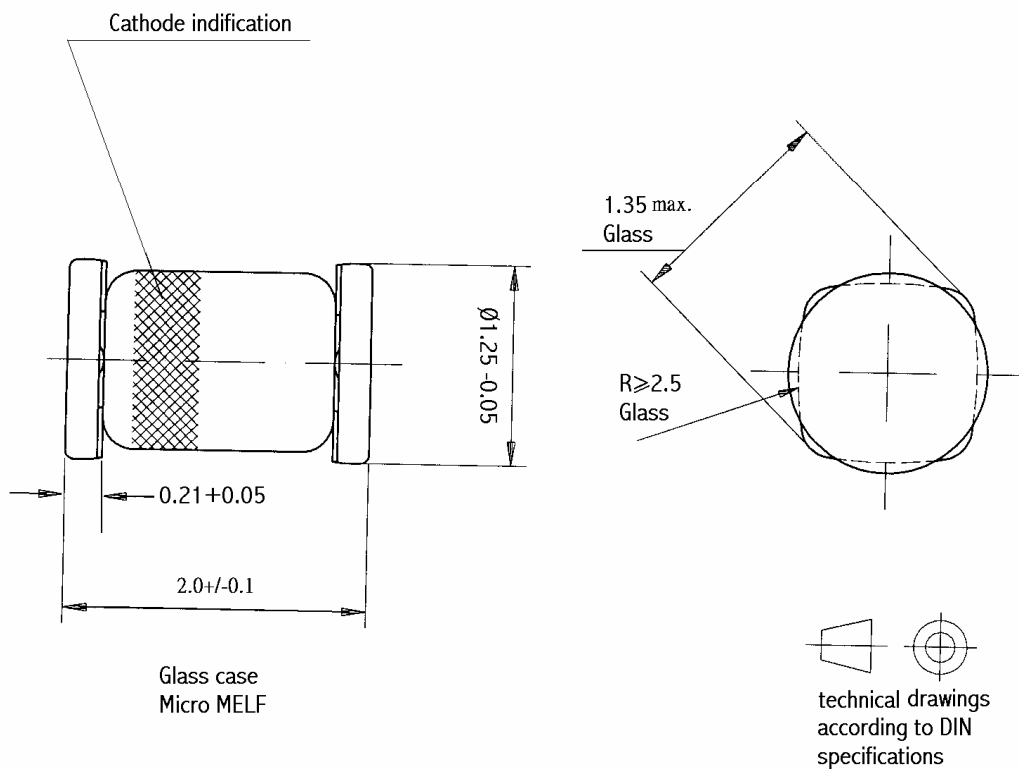
Dated : 20/08/2002

# MCL103A...MCL103C

## Characteristics at $T_{amb} = 25^{\circ}C$

	Symbol	Min.	Typ.	Max.	Unit
Leakage Current					
at $V_R = 30 V$	MCL103A	$I_R$	-	-	5 $\mu A$
at $V_R = 20 V$	MCL103B	$I_R$	-	-	5 $\mu A$
at $V_R = 10 V$	MCL103C	$I_R$	-	-	5 $\mu A$
Forward Voltage Drop					
at $I_F = 20 mA$		$V_F$	-	-	0.37 V
at $I_F = 200 mA$		$V_F$	-	-	0.6 V
Junction Capacitance					
at $V_R = 0 V, f = 1 MHz$		$C_{tot}$	-	50	- pF
Reverse Recovery Time					
at $I_F = I_R = 5 mA$ to $200mA$ , recover to $0.1 I_R$		$t_{rr}$	-	10	- ns

## Dimensions in mm



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